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REMARKS

Claims 1-16 are pending. Claim 1 is independent and is amended for form, e.g., for proper antecedent basis. Method claims 13-16 are added. Claim 13 defines the search and access phases in a manner similar to that of claim 1. Claims 14, 15, and 16 are respectively similar to claims 6, 8, and 11.

Claim 8 was presented incorrectly in the Amendment filed February 12, 2004. It is reproduced here as last amended in the response filed June 3, 2003. Accordingly, the objection to claim 8 is moot.

Claim 1 is amended to indicate the logic block is not necessarily part of the memory as might have been inferred from claim 1 as previously presented.

Applicant traverses and requests reconsideration of the rejection of claims 1-11 under 35 U.S.C. §102(b) as being anticipated by Wyland (U.S. Patent No. 5,440,715).

While not acquiescing to any rejection, but merely to advance prosecution of the present application, independent claim 1 is amended to recite a content addressable memory having a combination of elements, including a memory block comprising a data interface and a plurality of addresses sequentially addressable through the data interface and coupled to a common address bus.

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Wyland does not anticipate claim 1 as originally submitted or as now amended. Claim 1 calls for a plurality of cells. In Wyland, the only possible candidates for the "cells" of claim 1 are the CAM words, wherein CAM word 0 to CAM word 255 form 256 cells. These cells, each including a memory block, are serially connected in a chain by latches 120, 122, and 124. Even if one were to equate Wyland's registers 34 with the memory block of claim 1 for each of Applicant's claimed cells and the logic block and match flip-flop of claim 1 for each of the cells of Wyland's elements 38, 40, 42, 102, 110, and 120 (for the first cell), important distinctions remain. For example, Wyland's register 34 does not comprise a series of addresses which are sequentially addressable. Rather, register 34 is a single fully parallel register.

Further, claim 1, as previously presented, and new claim 13 require a memory in the search phase, to **serially** match a sequence of words on the data bus with the contents of a **sequence** of addresses in the memory block of each cell. This does not happen in Wyland. Claim 1, as previously presented, and new claim 13 further require that in each cell, the results of the matchings be stored cumulatively by the logic block of that cell. Again, that does not happen in Wyland. In Wyland, there is a single, fully parallel matching for each word, yielding a single match result.

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In Wyland, there is sequential matching, but that matching is word by word, i.e., register by register. If one tried to take this as the starting point for reading onto claim 1 as previously presented, it would force the entire sequence of words (CAM word 0 to CAM word 255) to correspond to a single cell of claim 1. The 48-bit registers would then have to collectively form the memory block. But then Wyland would not include a comparator coupled to a data interface of the memory block, as claim 1 previously required. In Wyland, there are plural comparators, each coupled to its own register. Nor does the cell have "a logic block" including a match flip-flop," as claim 1 previously required. In Wyland, each register has its own logic block. Also, Wyland would not have a plurality of cells connected in a chain, as claim 1 previously required. Instead, Wyland would have only a single cell; the can be no chain of cells.

In view of the foregoing, it is respectfully submitted that independent claims 1 and 13 are allowable. Since the remaining claims depend from allowable independent claims 1 and 13, these claims are also allowable for at least the reasons set forth above, as well as for the additional limitations provided by these claims. Favorable reconsideration is in order and is respectfully requested.

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Applicant heraby requests a three-month extension of time under 37 C.F.R. §1.136. Authorization for the fee of \$475 is attached. The Commissioner is hereby authorized to charge any shortage of fees, including extension of time fees, or to credit any overpayment to Deposit Account 07-1337.

Respectfully submitted,
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